

ABSTRACT

Comparisons of sundried grasses with fresh grass, bagasse and rice mill by-product in sheep

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Three experiments were conducted to compare the intakes and digestibilities of sundried forages and roughages with or without concentrates by Barbados Blackbelly crossbred sheep. In Experiment I there were no significant ($P > 0.05$) differences between treatments. In Experiments II and III there were significant ($P < 0.05$) differences between treatments. In Experiment I 4 x 4 and 5 x 5 latin square designs were used. Sheep with mean liveweights of 12.6 kg and 18.9 kg at the beginning of Experiment I and II, respectively, were fed Hybrid Pennisetum forages and untreated bagasse together with a basal concentrate at fixed levels in Experiment I and Guinea Grass, Tanner grass, bagasse, alkali treated bagasse and rice mill by-product, respectively, in Experiment II.

Experiment III was a randomised block design in which sheep having mean liveweight of 17.8 kg at the beginning of the experiment were fed fresh and sundried Tanner grass.

The digestibility of DM, CP, ADF and the intake of ADF in Experiment I showed no significant difference ($P > 0.05$) between treatments. Overall means were 74.6, 83.2, 64.2% and 182 g/an/day, respectively.

The bagasse diet had significantly ($P < 0.01$) lower DMI, CPI and DDMI. Overall means were 737, 175 and 54 g/an/day, respectively.

In Experiment II the roughage diets were significantly ($P < 0.01$) higher in DMD and ADFD, with overall means of 52.5 and 54.5%, respectively. While the CPD, DMI, CPI, ADFI and DDMI were significantly ($P < 0.01$) lower. Overall means were 23.3%, 363, 37.5, 181 and 191 g/an/day, respectively.

In Experiment III there were no significant ($P > 0.05$) differences between treatments in the digestibilities and intakes of DM, CP and ADF. Overall digestibilities were 54.1, 52.1 and 51.2% and intakes 400, 38.1 and 172 g/an/day, respectively.

Sundrying was a suitable method of producing conserved forage of fair quality to take the place of fresh forages.